AMENDMENTS TO THE CLAIMS

1-47. (Cancelled)

48. (Currently amended) A method for measuring an activity of an enzyme in a cell or cellular component thereof, said method comprising:

inducing or permitting catalysis of a reaction in the cell or cellular component thereof between a labeled substrate and the enzyme, said reaction producing altered labeled substrate;

disrupting or lysing said cell or cellular component thereof with a laser generated shock wave;

collecting said labeled substrate, altered labeled substrate, both or portions thereof; and

determining activity of the enzyme from a comparison of an amount of the altered labeled substrate and an amount of the labeled substrate molecules.

49. (Cancelled)

50. (Previously presented) The method of claim 48 wherein said collecting is within 33 msec or less of said disrupting or lysing of said cell.

51. (Previously presented) The method of claim 48 wherein said collecting is within 1 - 10 microseconds of said disrupting or lysing of said cell.

52-58. (Cancelled)

59. (Previously presented) The method of claim 48 wherein the collecting comprises collecting in an electrophoretic column or channel.

60. (Cancelled)

61. (Previously presented) The method of claim 48 wherein producing a laser generated shock wave comprises focusing a pulsed laser beam at a

position proximate to said cell or cellular component thereof without focusing on said cell or cellular component thereof, and generating said shock wave.

62. (Previously presented) The method of claim 48 wherein producing a laser generated shock wave comprises focusing a pulsed laser beam directly in or on said cell or cellular component thereof, and generating said shock wave.

63. (Previously presented) The method of claim 62, further comprising defining an opening in said cell of cellular component thereof to lyse only cytoplasmic contents therefrom by said focusing of the pulsed laser beam directly in or on said cell or cellular component thereof.

64. (Previously presented) The method of claim 48 wherein said collecting is by fluid flow of said medium.

65. (Previously presented) The method of claim 64 wherein said collecting is by siphon fluid flow of said medium.

66. (Previously presented) The method of claim 48 wherein said collecting is by electrophoresis through said medium.

67. (Previously presented) The method of claim 64 wherein said collecting is by force from said shock wave.

68. (Previously presented) The method of claim 64 wherein said collecting is by electroosmotic fluid flow.

69. (Previously presented) The method of claim 48 wherein producing a laser generated shock wave is performed at an energy density level just sufficient to split open said cell so that substantially all of said contents of said lysed cell or cellular component thereof and said substrate remain proximate to said lysed cell or cellular component thereof.

70. (Previously presented) The method of claim 48 further comprising analyzing said collected substrate and altered substrate by laser induced fluorescence.

71. (Previously presented) The method of claim 48 further comprising utilizing said collected substrate.

72. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumen of a capillary of a micropipette.

73. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumen of a microfabricated channel.

74. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumen, and further comprises aspirating into said microlumen.

75. (Previously presented) The method of claim 74 wherein said aspirating comprises aspirating into a capillary of a micropipette.

76. (Previously presented) The method of claim 74 wherein said aspirating into said microlumen comprises aspirating into a microfabricated channel.

77. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumen, and comprises collecting within one second of producing the laser generated shock wave.

78. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumenwithin 33 msec of producing the laser generated shock wave.

79. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumenwithin 10 microseconds of producing the laser generated shock wave.

80. (Previously presented) The method of claim 48 wherein said collecting comprises collecting with a microlumenwithin 1 microsecond of producing the laser generated shock.

81. (Previously presented) The method of claim 48 further comprising analyzing said substrate after lysis by an analysis device, wherein said substrate has no substantial difference in form between the condition of said substrate before and after lysing.

82. - 127. (Cancelled).